

S
363.728
H2 per va
B-1 1987

DEPARTMENT OF HEALTH AND
ENVIRONMENTAL SCIENCES

BILLINGS REGIONAL OFFICE



TED SCHWINDEN, GOVERNOR

STATE OF MONTANA

STATE DOCUMENTS COLLECTION

DEC 29 1987

MONTANA STATE LIBRARY
1515 E. 6th Ave.
HELENA, MONTANA 59620

December 7, 1987

PLEASE RETURN

Re: Preliminary Environmental Review
Valley County Refuse Disposal
District #1, Class II Landfill

Board of County Commissioners, Valley County, Box 311, Glasgow, MT. 59230
Valley County Refuse Disposal District #1, Box 311, Glasgow, MT. 59230
Mr. Wilmer F. Zeller, Mayor, City of Glasgow, Box 431, Glasgow, MT. 59230
Ms. Barbara Boner, Mayor, Town of Nashua, Box 47, Nashua, MT. 59248
Mr. Truels Jensen, Jr., Mayor, Town of Opheim, Box 14, Opheim, MT. 59250
Ms. Kay Fjeld, R.S., Valley Co. Sanitarian, Courthouse, Glasgow, MT. 59230
Mr. David J. Hide, M.D., Valley Co. Health Officer, 640 7th Ave. N, Glasgow
Mr. Ken Ryan, Chairman, Ft. Peck Tribes, Box 637, Poplar, MT. 59255
Ms. Jackie W. Miller, Director, Ft. Peck Office of Envir. Prot., Box 637, Poplar
Mr. Jerry Lee, Tribal Sanitarian, PHS Indian Health Service, Indian Health
Center, Poplar, MT. 59255
Mr. David L. Nielsen, Valley Co. Attorney, Box 311, Glasgow, MT. 59230
Mr. David P. Gabbert, Manager, Dept. of Trans., FAA Airports Dist. Off., FAA
Bldg. Rm. 2, Helena Regional Airport, Helena, MT. 59601
Mr. & Mrs. H. Ronald Osterberg, Rt. 1-4952, Glasgow, MT. 59230
Mr. Gerald J. McCleery, Box 563, Nashua, MT. 59248
Mr. Bernard Blomer, Box 102, Glasgow, MT. 59230
Ms. Martha Nilson & Ms. Helen Archambeault, 307 Nemont Manor, Glasgow, MT. 59230
Mr. & Mrs. Donald G. Pliley, Rte. 1-4945, Glasgow, MT. 59230
Mr. Lawrence R. Hlad, South Star Rte., Box 290, Nashua, MT. 59248
Mr. & Mrs. Fred G. Bruce, Nick Knaff, Rte. 1, Box 4961, Glasgow, MT. 59230
Mr. Alfred J. Knaff, Rte. 1-4962, Glasgow, MT. 59230
Mr. Tom Ellerhoff, Environmental Sciences Div., D.H.E.S., Helena, MT. 59620
Environmental Quality Council, Capital Complex, Helena, MT. 59620
Document Section, State Library, Capital Complex, Helena, MT. 59620
Mr. Barry Damschen, P.E., Damschen and Assoc., Box 4817, Helena, MT. 59604
Mr. Jim Leiter, S.H.W.B., Cogswell Bldg., Helena, MT. 59620

Ladies and Gentlemen:


Pursuant to the Administrative Rules of Montana, 16.2.604, the following
Preliminary Environmental Review has been prepared by the Department of Health
and Environmental Sciences concerning the proposed Valley County Refuse Disposal
District #1 Class II Landfill.



The purpose of the Preliminary Environmental Review is to inform all interested governmental agencies, public groups, or individuals of the proposed action and to determine whether or not the action may have a significant effect on the environment. This Preliminary Environmental Review will be circulated for a period of fifteen (15) days at which time a decision will be made as to our future action.

If you care to comment on this proposed action, please do so within the allotted time. Your comments can be sent to me in care of the Department of Health and Environmental Sciences, Solid & Hazardous Waste Bureau, 1500 N. 30th, Eastern Montana College Box 108, Billings, MT. 59101-0298

Sincerely,


Jon A. Dilliard, R.S.
Solid & Hazardous Waste Bureau
Billings Regional Office

encl.



DEPARTMENT OF HEALTH AND ENVIRONMENTAL SCIENCES
Cogswell Building, Helena, Montana 59601
(406) 444-2821

PRELIMINARY ENVIRONMENTAL REVIEW

Division/Bureau Environmental Sciences Division/Solid & Hazardous Waste Bureau

Project or Application Valley County Class II Landfill

Description of Project Valley County has submitted a solid waste management system license application to this Department for an 80 acre Class II Landfill site to be located in the N 1/2, NE 1/4, Section 16, T28N, R40E (see attached map). The proposed landfill site is owned by Valley Co. and is approximately 3 miles east of Glasgow, MT. This landfill will be used in conjunction with a separately licensed roll-off container system with 6 container sites located near Hinsdale, Tampico, Ft. Peck, Nashua, Opheim, and at the entrance to the landfill. This system will serve a population of approximately 10,000.

POTENTIAL IMPACT ON PHYSICAL ENVIRONMENT

	Major	Moderate	Minor	None	Unknown	Comments on Attached Pages
1. Terrestrial & aquatic life and habitats			X			X
2. Water quality, quantity and distribution			X			X
3. Geology & soil quality, stability and moisture				X		
4. Vegetation cover, quantity and quality			X			X
5. Aesthetics			X			X
6. Air quality			X			X
7. Unique, endangered, fragile, or limited environmental resources				X		
8. Demands on environmental resources of land, water, air & energy				X		
9. Historical and archaeological sites				X		

POTENTIAL IMPACTS ON HUMAN ENVIRONMENT

	Major	Moderate	Minor	None	Unknown	Comments on Attached Pages
1. Social structures and mores				X		
2. Cultural uniqueness and diversity				X		
3. Local and state tax base & tax revenue				X		
4. Agricultural or industrial production			X			X
5. Human health				X		
6. Quantity and distribution of community and personal income				X		
7. Access to and quality of recreational and wilderness activities				X		
8. Quantity and distribution of employment			X			X
9. Distribution and density of population and housing				X		
10. Demands for government services			X			X
11. Industrial & commercial activity				X		
12. Demands for energy			X			X
13. Locally adopted environmental plans & goals				X		
14. Transportation networks & traffic flows			X			X

Other groups or agencies contacted or which may have overlapping jurisdiction Valley County Health Department

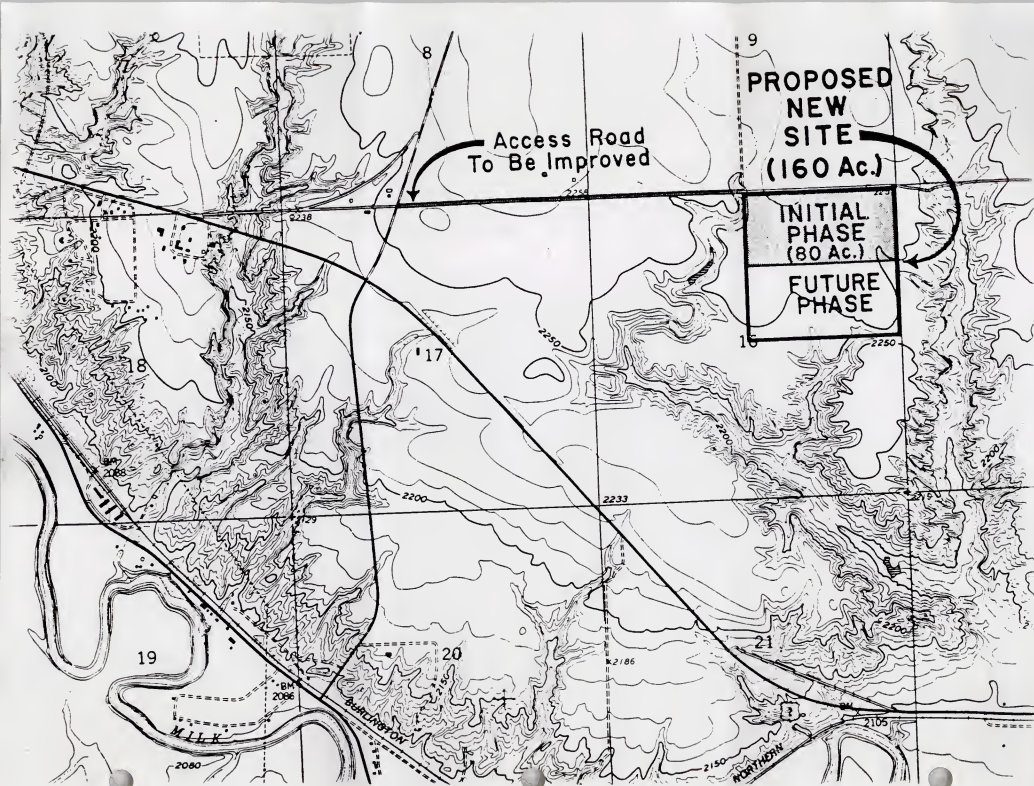
Individuals or groups contributing to this PER. Valley County Commission,

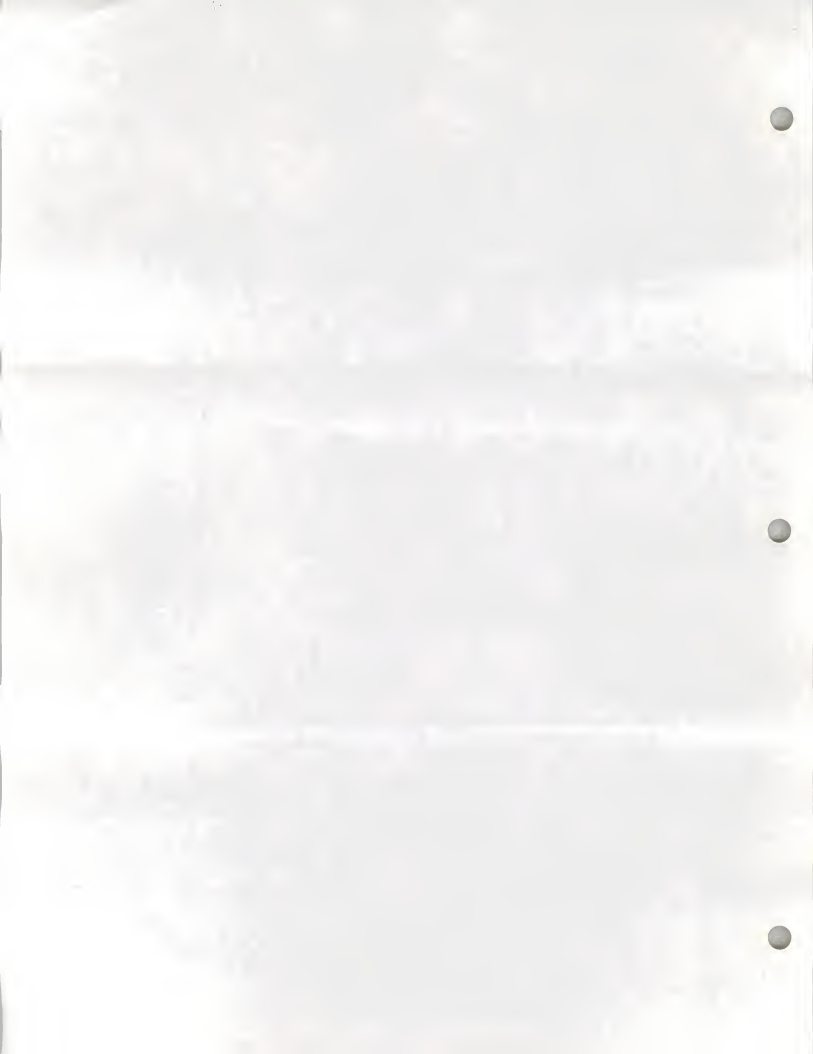
Barry Damschen & Associates, Valley County Health Department

Recommendation concerning preparation of EIS Not Necessary

PER Prepared by: Jan A. Dilliard

Date: December 7, 1987 Jan A. Dilliard





VALLEY COUNTY SOLID WASTE PROGRAM
CLASS II. SANITARY LANDFILL

General Comments

Valley County is proposing to license a Class II Sanitary Landfill on 80 acres of a 160 acre parcel of land owned by the county. This land is located approximately 3 miles east of Glasgow, MT. in the NW/4, of Section 16, T28N, R40E. As an additional portion of the solid waste program, Valley County is proposing to license six (6) roll-off container sites to be located near Hinsdale, Tampico, Fort Peck, Nashua, Opheim, and the Class II Sanitary Landfill entrance at Glasgow.

Class II Sanitary Landfill

The landfill is to be developed in four (4) phases. Each phase will consist of nine (9) trenches excavated to depths of 10 to 12 feet in a northerly direction. In addition to the trenches it is proposed to add a 6 foot lift of refuse on top of the full trench thereby creating a dome shape to divert surface water away from the site.

Nineteen, 20 foot test pits and two, 50 foot test holes were excavated at the site. Soil samples taken from the pits and holes indicate that the site is underlain by very impermeable clay and sandy clay. The 50 foot test holes indicated that no perched groundwater or flowing groundwater was present in that range.

Litter will be controlled at the site by a perimeter litter fence and by portable litter screens at the working area. As needed, the county will provide labor to hand pick litter that has accumulated on the litter fences and on and off the site itself.

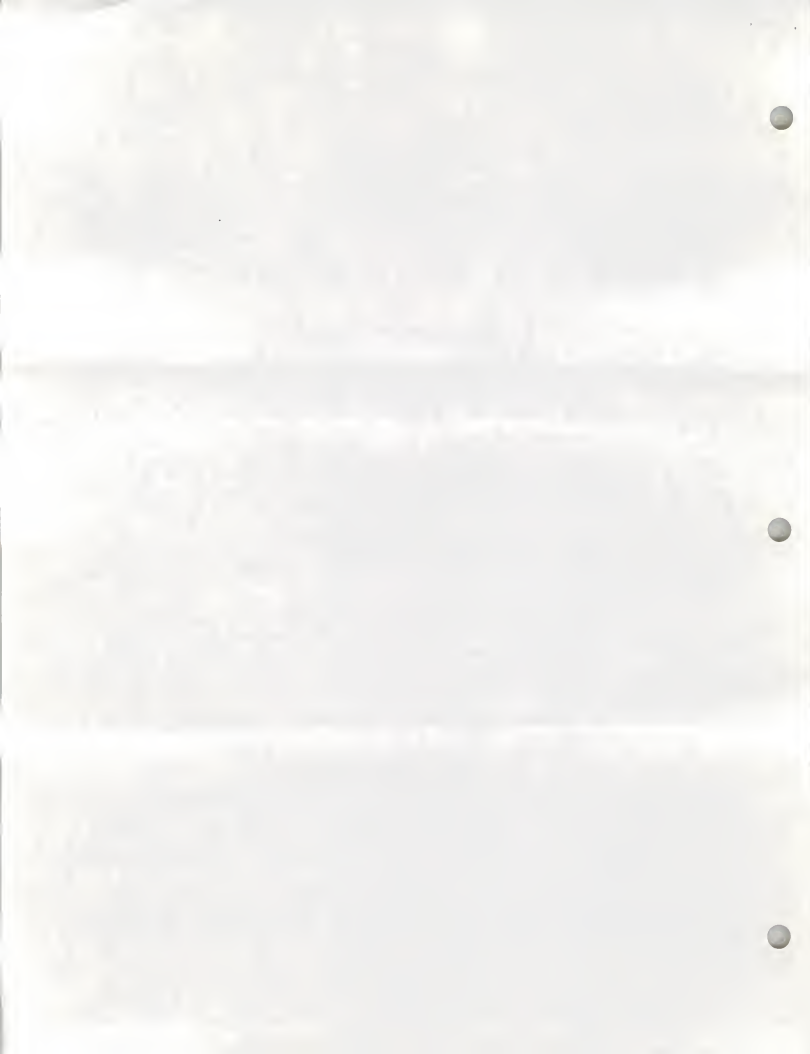
Access to the landfill site will be limited to commercial waste haulers. The general public or "self" haulers will be directed to use any of the six (6) roll-off container sites located in the county. The exception to this limited access will be during designated "clean-up" days or individuals with extremely large loads after special arrangements have been made.

The life of the site is estimated to be seventy-one (71) years.

Roll-Off Container System

The roll-off container system will consist of six (6) sites located near Hinsdale, Tampico, Fort Peck, Nashua, Opheim, and the entrance of the landfill. These container sites will have two (2) container bays with one (1) container present at all times, except for the site at the landfill which will have 3 bays and 2 containers. The container sites will be un-manned and open to the public.

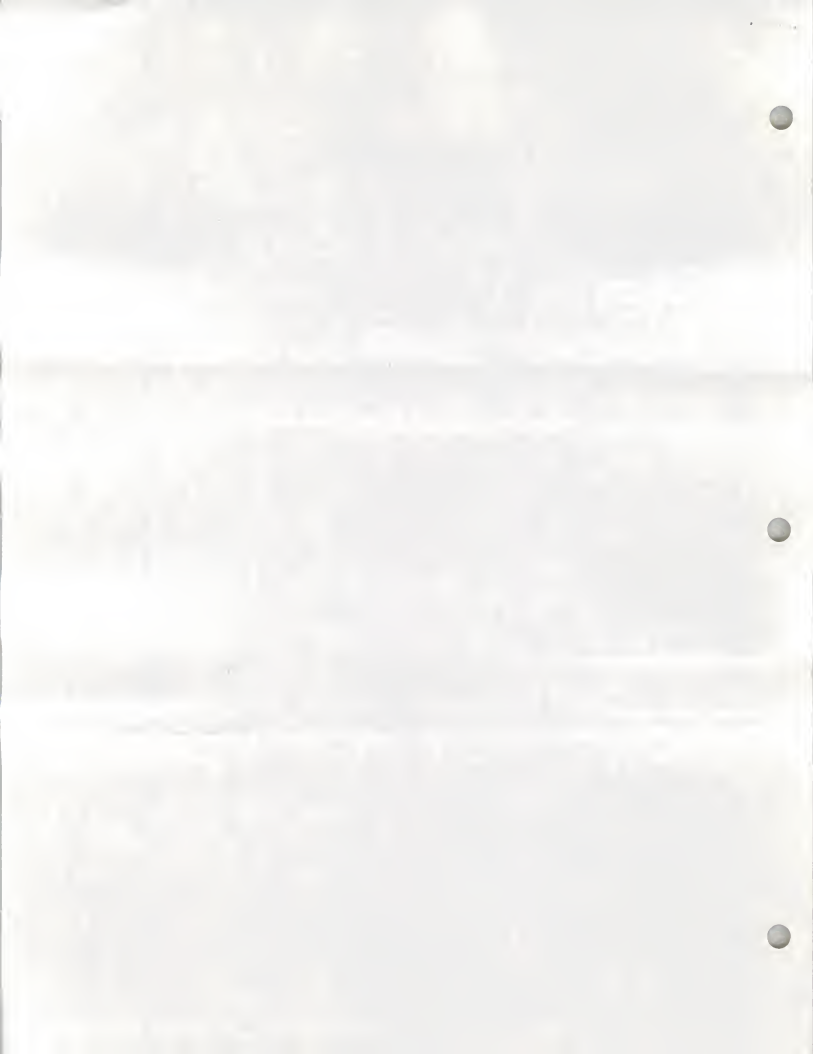
For litter control at the container sites the perimeter of the area will be supplied with litter controlling fences. During transport the containers will have a closed metal screen lid to prevent litter from escaping. The hauler will be responsible for litter pick-up at the sites.



Roll-Off Container System

During normal operations of the roll-off container program, a tilt-frame vehicle will deliver an empty container to a container site. After the empty container has been placed at the site, the vehicle will load a full container for transport and disposal at the landfill. Each container must be emptied at least weekly or more frequently if waste generation requires.

Valley County is proposing to use a private contractor to provide the roll-off containers, tilt-frame vehicle and hauling services.



VALLEY COUNTY SOLID WASTE PROGRAM
CLASS II SANITARY LANDFILL
Page 3

Potential Impact on Physical Environment

1) Terrestrial and Aquatic Life and Habitats

Operation of the landfill will displace the mobile wild life and insect species which might inhabit the site. These species will be repelled from the site and adjacent areas due to noise, human activity and the destruction of habitat. Due to the presence of similar habitat nearby to the proposed site the loss of this habitat during landfilling operations will be minimal. Once the landfill areas are used and reclaimed as proposed the displaced species will be able to return.

2) Water Quality, Quantity and Distribution

If buried refuse comes into contact with water either through surface or groundwater infiltration, contaminants will be released by the refuse and form "leachate". Due to the chemical properties of leachate, substantial impacts to groundwater quality can occur if this leachate migrates into a groundwater aquifer.

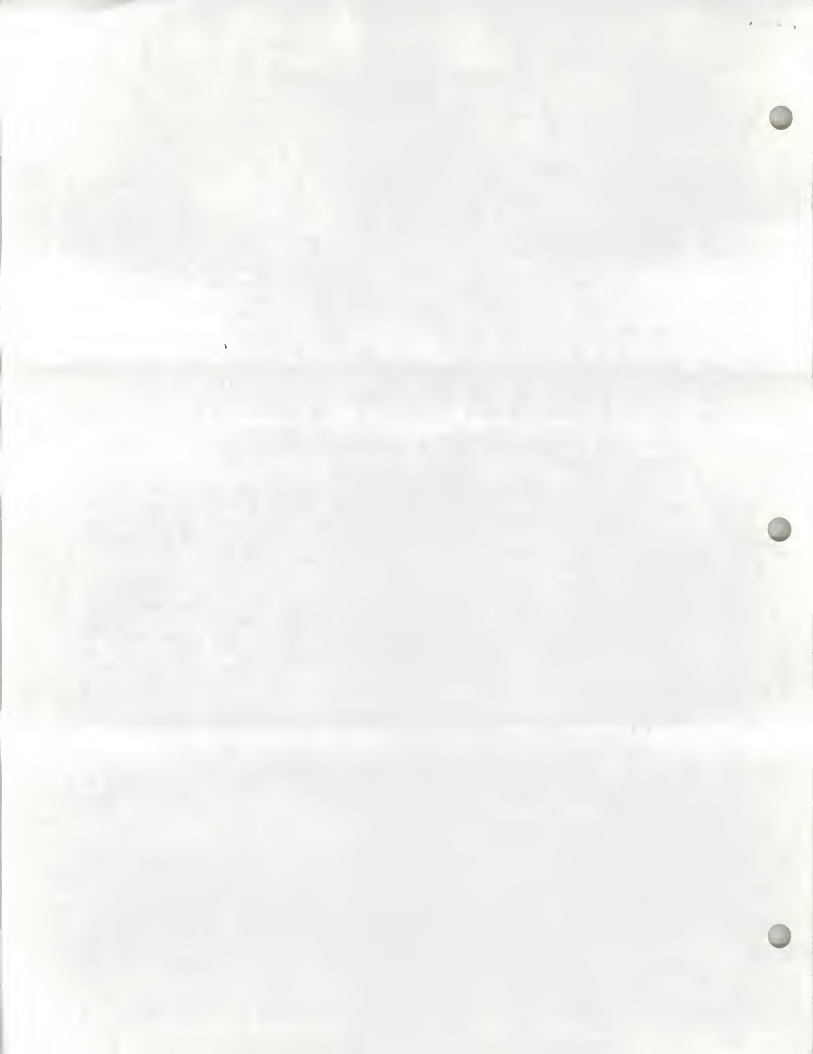
The soil tests conducted at the landfill site indicate that the site is underlain by impermeable clay and sandy clay. This type of soil will inhibit the migration of any leachate which could be produced. The test holes drilled on site indicate that no groundwater exists to a depth of 50 feet. This will also inhibit leachate from reaching groundwater.

The operational plans for the landfill include the sloping of the trench bottoms to drain any surface runoff away from the working areas and the eventual doming of the landfill to provide positive drainage away from the waste filled areas. The plans have been developed so that a down gradient exists towards the southern boundary of the landfill. This would allow for the installation of a collection system at that point should leachate ever be detected at the site.

Due to the low amount of moisture that falls in the area coupled with the on and off-site drainage controls and the type of soils in the area, it is unlikely that any significant amount of leachate will be generated at the landfill site. Despite this unlikelihood of significant leachate production, two (2) monitoring wells have been installed at the site and will be continually checked for the presence of leachate.

4) Vegetation Cover, Quantity and Quality

The current vegetation cover at the landfill site is agriculturally managed wheat. During operation of the landfill, the vegetative cover in working areas will be lost. The exposed areas will be subject to wind or rain erosion but this should be manageable during normal operation. The remainder of the site as well as already filled trench areas will continue to be covered with agriculturally managed wheat and/or barley. The loss of small areas of the vegetation cover is not expected to have any significant impact on the environment.



VALLEY COUNTY SOLID WASTE PROGRAM
CLASS II SANITARY LANDFILL
Page 4

5) Aesthetics

Normal operations of the landfill will have the appearance of an area continually under construction. With daily covering of refuse, adequate litter control, and orderly operations, the landfill should not be overly displeasing to the eye.

6) Air Quality

Excavation of trenches and covering of refuse at the site will create temporary but minor emissions of dust. Dust emissions will also be increased by heavier traffic flows on the main access road to the landfill. Since the general vicinity of the proposed landfill site is sparsely populated, these emissions should not have a significant impact on the environment and should be well dispersed before reaching populated areas.

State air quality rules allow for the issuance of burning permits to licensed solid waste management facilities for the disposal of untreated wood waste only. These burning permits are issued by the Department during the state's general burning season from April through August. Burning permits are issued for individual burns and only when atmospheric conditions provide for good ventilation and emission dispersal. These periodic untreated wood waste fires are not expected to significantly impact the area's air quality.

Potential Impacts on Human Environment

4) Agricultural or Industrial Production

The proposed landfill site is currently being used for the agricultural production of wheat. During the landfill operations it is proposed to keep all but the actual working trench area in farming. When a trench area is filled and closed it will be returned to production. The loss of this small amount of agricultural production is not expected to create any severe impacts.

8) Quantity and Distribution of Employment

Valley County is proposing to operate the landfill 40 hours per week. The district will employ one full-time equipment operator and one or more temporary part-time gate keepers and/or litter pickers.

10) Demands for Governmental Services

Demands on governmental services will be required on the local and state level to inspect the facility and to ensure the site is being operated in accordance with state law and regulations. Decision making processes will require governmental involvement and the issuance of a license will require administrative time and effort.



VALLEY COUNTY SOLID WASTE PROGRAM
CLASS II SANITARY LANDFILL
Page 5

12) Demands for Energy

Gasoline, diesel fuel, and other petroleum products will be consumed in the operation of the excavation, compaction and covering equipment used during landfill operations. This increased consumption should not place any significant stress on local supplies.

14) Transportation Networks and Traffic Flows

The landfill site will be located approximately 3 miles east of Glasgow, MT. and serve a population of approximately 10,000. Traffic flows in the area of the landfill are expected to increase as a result of commercial waste hauling equipment and private vehicles traveling to and from the landfill.

An all weather access road will be constructed from Highway 24 to the site by the Valley County Road Department. Also, the District will subcontract with the Road Department to provide gravel, blading and snow removal on the main access road.

These increases in traffic flows and patterns are not anticipated to create any severe impacts to the area of the landfill.

